OnTheMap

How to use an Advanced Selection Area

Local Employment Dynamics

Users can define a second (advanced) selection area and use this area to limit both the home and work areas of an analysis, or add, intersect, or subtract the area from the 1st selection area. To create an advanced selection, click the "Confirm and Add Advanced Selection" button in the Selection tab, or click "Add Advanced Selection" in the Selection Area popup. Information on *Adding To* the 1st selection area can be found on page 3, *Intersecting With* on page 4, and *Subtracting From* on page 6.

Using an Advanced Selection to Create a Paired Area

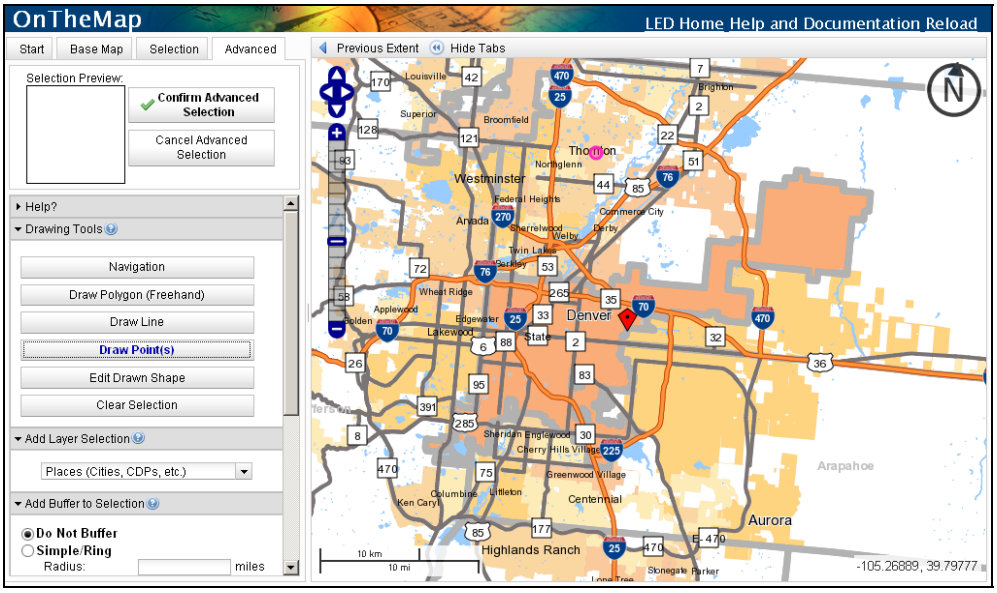
Performing a Paired Area Analysis allows users to limit the group of jobs to those that share the selected home and work areas. In this example, we will analyze workers who are employed in Denver and live in Thornton, CO.

1. Go to the **Quick Links** section at http://lehd.did.census.gov and choose **OnTheMap Version 5**.

2. Enter **Denver** in the Search text box of the Start tab and click **Search**.

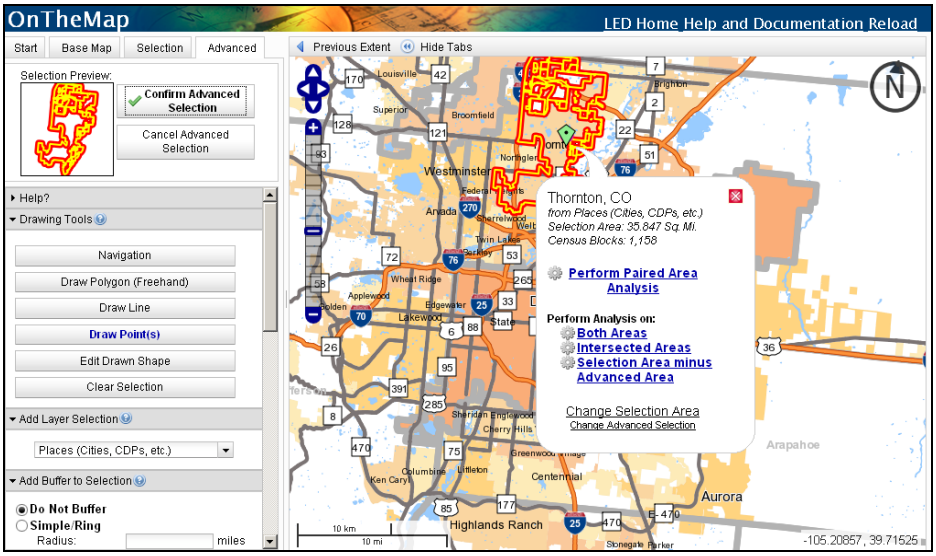
3. Select **Denver, CO** by clicking the name under the Places (Cities, CDPs, etc.) heading.

4. After the map of Denver appears, click **Add Advanced Selection** at the bottom of the Selection Area popup.

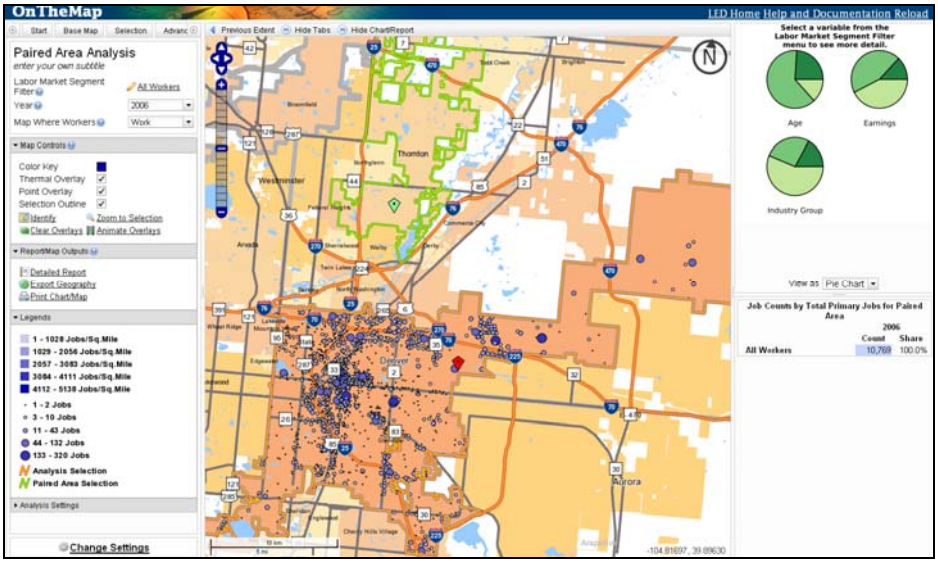


5. In the **Drawing Tools** section of the Advanced tab, select *Draw Point(s).* In the **Add Layer Selection** dropdown menu, select *Places (Cities, CDPs, etc.).* Click once inside the city of Thornton, just north of Denver, to drop a pink circle in that location.

6. Click **Confirm Advanced Selection**. Thornton, CO will be highlighted in red. If it isn't, click *Clear Selection* in the **Drawing Tools** menu and try again.



7. Click **Perform Paired Area Analysis** to display the Paired Area Analysis Settings popup. Keep the default settings and click **Go!**



8. Thornton, where workers live, is highlighted in green. Denver, where workers are employed, is highlighted in red. The Point and Thermal overlays are showing where workers that live in Thornton are employed within the city of Denver. Use the **Map Where Workers** dropdown menu in the upper left to display overlays showing where workers that share this paired area live.

9. To analyze workers that live in Denver but work in Thornton, click the **Change Settings** button at the bottom of the Results tab and click the **Swap** button under **Home/Work Area**. Click **Go!** to display analysis results on workers living in Denver and working in Thornton.

Adding an Advanced Selection to the 1st Selection Area

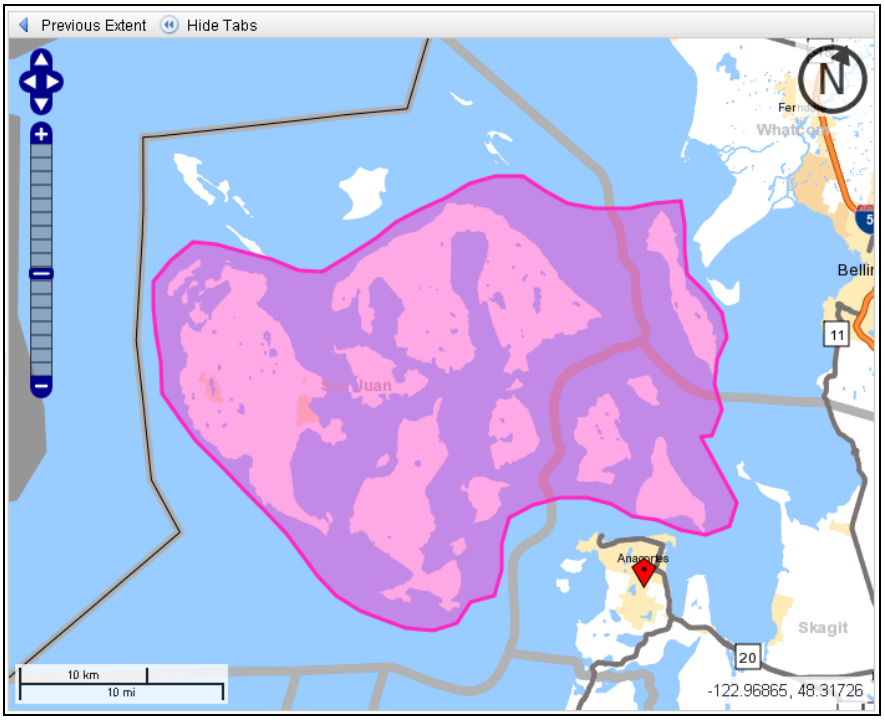
Alternatively, an advanced selection area can be used to create more complex selection areas for a single-sided analysis. Users can create an advanced selection area that is fundamentally different than the 1st selection area and add them together to create a unique analysis area. In this example, we will analyze workers employed in the city of Anacortes, WA and the surrounding islands to the north of the city.

1. Enter **Anacortes** in the Search text box of the Start tab and click **Search**.

2. Select **Anacortes, WA** by clicking the name under the Places (Cities, CDPs, etc.) heading.

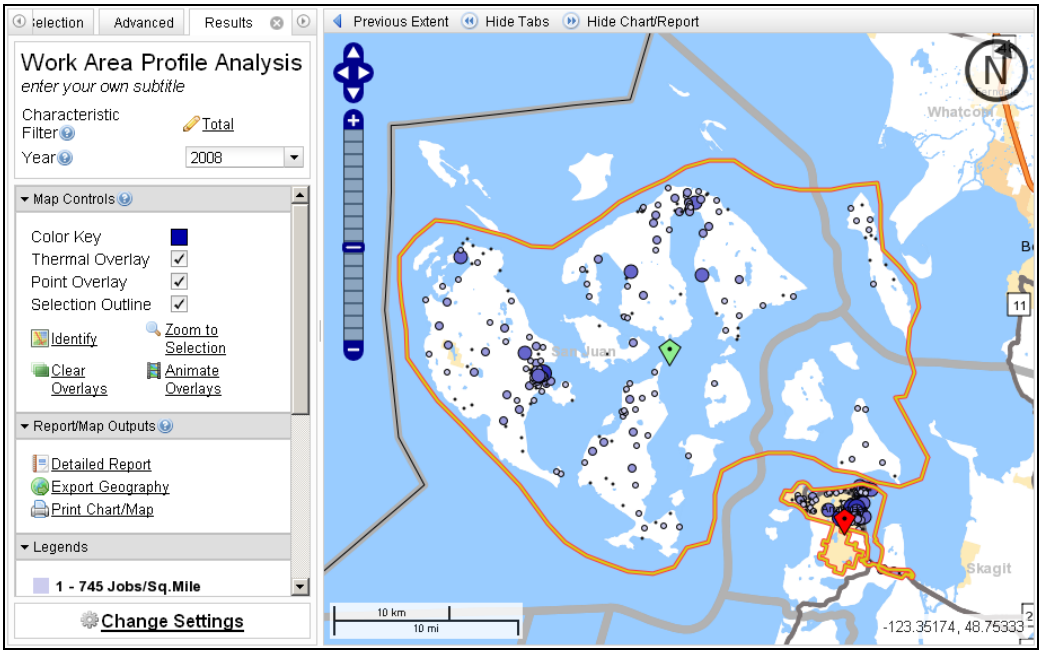
3. After the map of Anacortes appears, click **Add Advanced Selection** at the bottom of the Selection Area popup.

4. Zoom out a few levels using the Zoom Ladder tool so the surrounding islands to the north are visible. In the **Drawing Tools** section of the Advanced tab, select *Draw Polygon (Freehand)* and draw a freehand area around the islands. Freehand areas can be adjusted by clicking the *Edit Drawn Shape* tool and manually moving the pink circles (vertices) to create the desired shape. Click **Confirm Advanced Selection** to confirm and view the advanced selection and continue the analysis.



5. In the Advanced Selection popup, click **Both Areas** under the *Perform Analysis on:* heading. The standard Analysis Settings popup window will appear, and we can select any of the five available analysis types. Keep the default settings and click **Go!**

6. The analysis results display work locations within the nonstandard area composed of the city of Anacortes and the freehand area around the islands to the north.



Intersecting an Advanced Selection With the 1st Selection Area

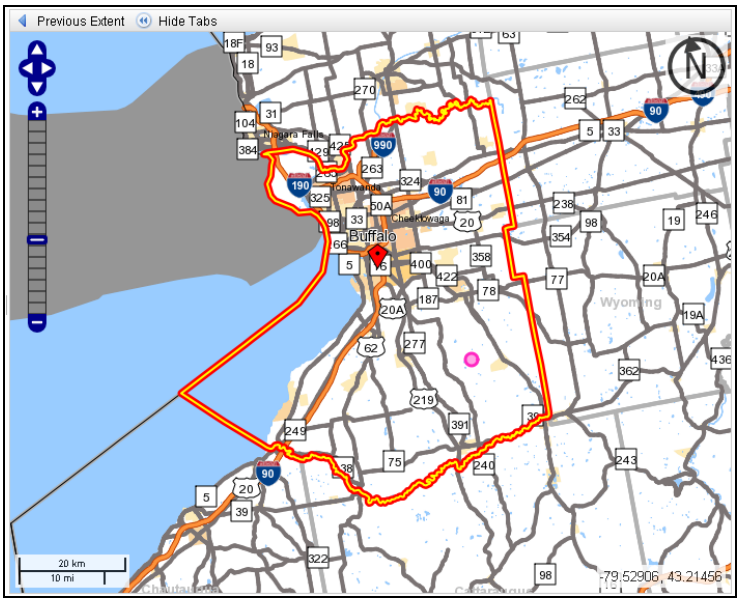
An advanced selection can also be used to select only the overlapping portion of the two selected areas. In this example, we will perform an analysis on the portion of New York's 27th Congressional District that fall within Erie County.

1. Enter **Erie** in the Search text box of the Start tab and click **Search**.

2. Select **Erie, NY** by clicking the name under the Counties heading.

3. After the map of Erie appears, click **Add Advanced Selection** at the bottom of the Selection Area popup.

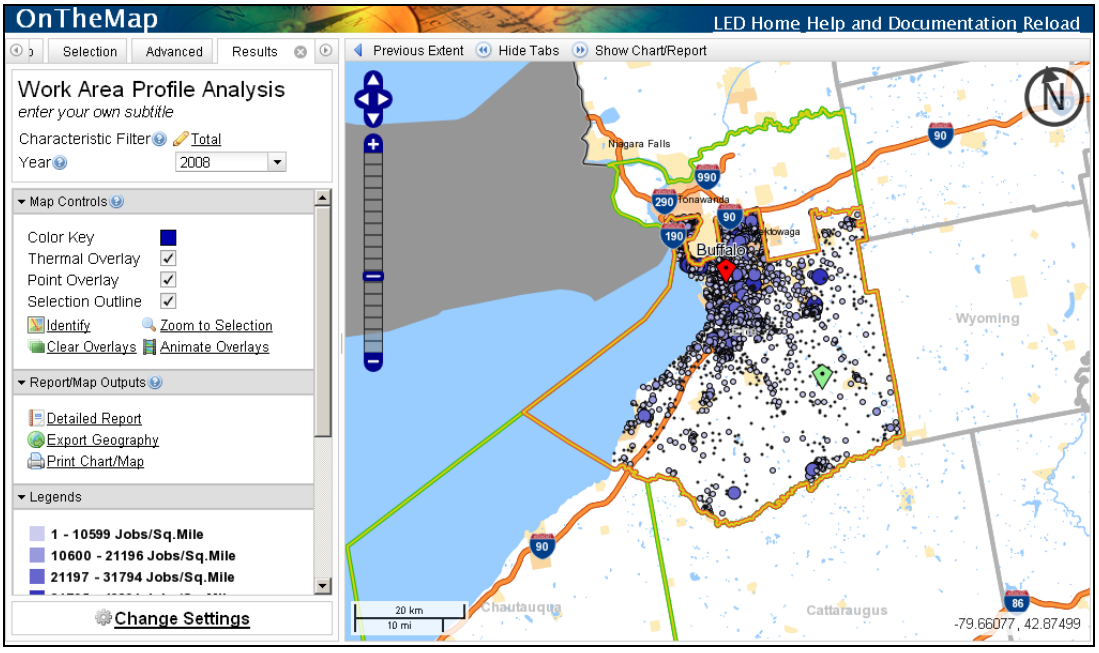
4. In the **Add Layer Selection** dropdown menu of the Advanced tab, select *111th Congressional Districts*. Then select *Draw Point(s)* in the **Drawing Tools** section and click inside of the southern half of Erie County so that a pink dot appears (see below). Click **Confirm Advanced Selection**. Even though the 111th Congressional District layer is not visible in the base map, the district containing the drawn point will be selected.



5. In the Advanced Selection popup, click **Intersected Areas** under the *Perform Analysis on:* heading.

6. In the **Analysis Settings** popup, all of the standard analysis types are available. Keep the default settings and click **Go!**

7. The non-overlapping areas of Erie County and NY's 27th Congressional District are outlined in green, while the actual selection area (the intersection) is outlined in red. The analysis results display work locations inside the intersection of the 1st and advanced selection areas.



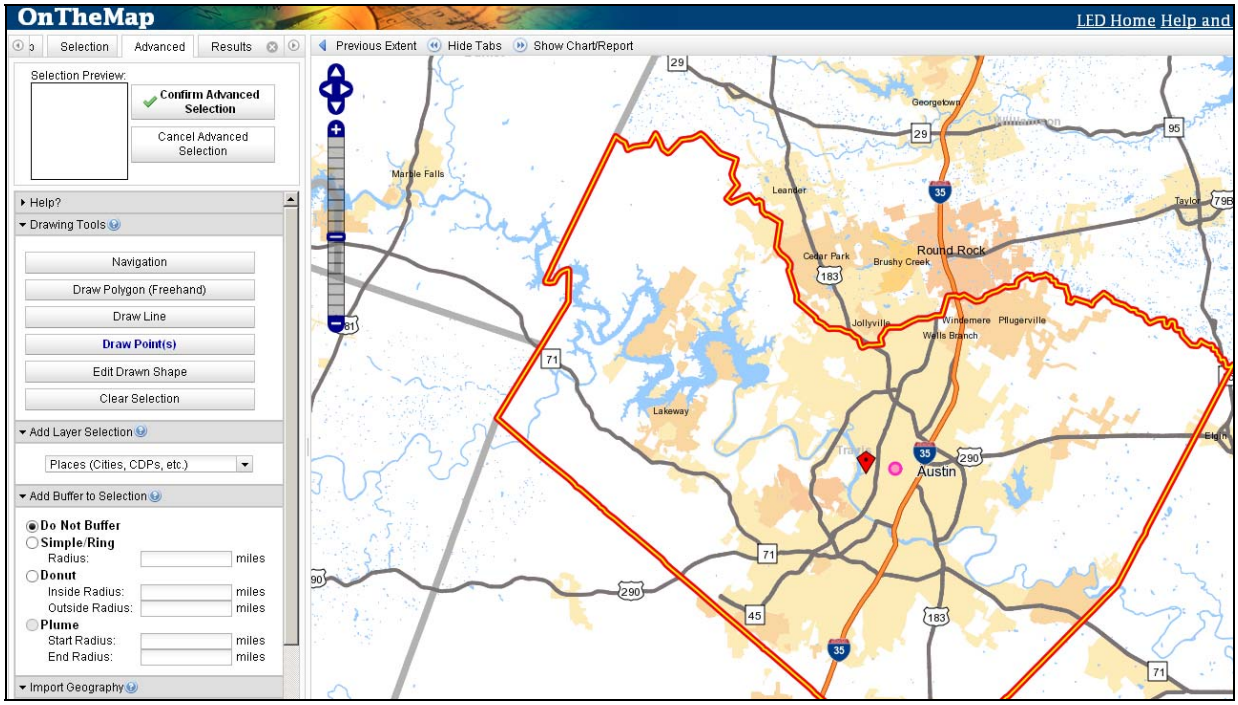
Subtracting an Advanced Selection from the 1st Selection Area

Finally, an advanced selection area can be used to exclude areas from analysis. The county of Travis, TX contains a significant portion of the city of Austin. Suppose we are interested in analyzing employment in the parts of the county not incorporated into Austin. In this example, we will create a selection area by subtracting the city of Austin from Travis County.

1. Enter **Travis** in the Search text box of the Start tab and click **Search**.

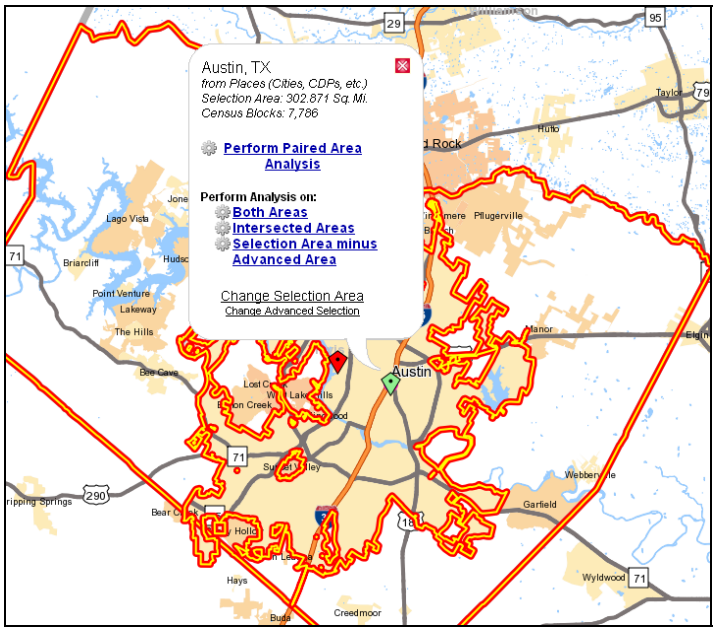
2. Select **Travis, TX** by clicking the name under the Counties heading.

3. After the map of Travis County appears, click **Add Advanced Selection** at the bottom of the Selection Area popup.



4. In the **Add Layer Selection** dropdown menu of the Advanced tab, select *Places (Cities, CDPs, etc.)*. Then select *Draw Point(s)* in the **Drawing Tools** section and click inside the city of Austin to drop a pink dot (see above). Click **Confirm Advanced Selection** to confirm and view the selection and continue with the analysis.

5. In the Advanced Selection Area popup, click **Selection Area Minus Advanced Area** under the *Perform Analysis on:* heading. The advanced selection area (Austin) will be subtracted from the 1st selection area (Travis County), which leaves only the desired portion of the 1st selection area to be analyzed.



6. In the **Analysis Settings** popup, all of the standard analysis types are available. Keep the default settings and click **Go!**

7. The analysis results display work locations in the portion of Travis County not incorporated into the city of Austin.